

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

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Christopher C. Cummins et al.

Application No:

10/666,565

Art Unit:

1764

Filed:

September 19, 2003

Attorney Document No. MTV-054.01

For:

Formation of Enediynes by Reductive

Coupling Followed by Alkyne

Metathesis

CERTIFICATE OF FIRST CLASS MAILING

I hereby certify that this correspondence is being deposited with the United States Postal Service as First Class Mail, postage prepaid, "Post Office to Addressee", in an envelope addressed to the Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on February 5, 2004.

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Shirine Darvish

INFORMATION DISCLOSURE STATEMENT UNDER 37 CFR 1.97

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

Sir:

Submitted herewith on Form PTO-1449 is a listing of documents known to Applicants and/or their attorney in compliance with the requirements of 37 CFR 1.56. Copies of the documents are also being submitted.

This submission does not represent that a search has been made or that no better art exists. Nor does it constitute an admission that the cited documents are material or constitute "prior art." If the Examiner applies the listed documents as prior art against any claim in the application and Applicant determines that the cited documents do not constitute "prior art" under United States law, Applicant reserves the right to present to the Office the relevant facts and law regarding the appropriate status of such documents. Applicant further reserves the right to take

appropriate action to establish the patentability of the disclosed invention over the listed documents, should one or more of the referenced documents be applied against the claims of the present application.

Under 37 C.F.R. § 1.97 (b)(3), this Information Disclosure Statement is being filed before the mailing date of the first Office Action on the merits; therefore, no fee is believed to be due in connection with this submission. However, the Commissioner is authorized to charge any deficiencies or credit any overpayment to/from our **Deposit Account**, No. 06-1448, Reference MTV-054.01.

Date: February 5, 2004

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Respectfully Submitted,

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Attorney for Applicant

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Form PTO-1449 INFORMATION DISCLOSURE CITATION IN AN APPLICATION (Use several sheets if necessary)				Docket Number (Optional) MTV-054.01					ication Number 56,565			
				Applicant Cummins, et al.	FE	3 0 9 2004	CA A	,				
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EXAMINER INITIAL	DOCUMENT NUMBER DATE			E NAME				CLASS	SUBCLASS FILING DAT		RIATE	
	AA US 2002/0072632 A1 06/13		06/13/	3/02 Guram et al.		564		15	02/01/02			
	АВ	US 2002/0034829 A1	03/21/	02	Hall et al.			436	518	03/26/01		
	AC	US 6,391,916 BI	05/21/	02	Dai et al Jones et al. Grubbs et al.			514	529	07/21/0	0	
	AD	5,436,361	07/25/	95				556	466	04/22/94		
	AE	US 2002/0058812 A1	05/16/	02				546	2			
	AF	US 6,175,047 B1	01/16/	701	Hori et al.			585	645	12/23/98		
			J	FOREIGN PA	TENT D	OCUME	NTS					
	D	OCUMENT NUMBER	COUNTRY CLAS		CLASS	SUBCLASS	Translati YES	on NO				
	AG	WO 99/40047	08/12/	99	Germany			С07В	37/10	Х		
	AH EP 1 022 282 A2 01/22/5		Europe				CO7F	15/00	Х			
											<u> </u>	
	1 1			CUMENTS		A 11 12 . 3			or, Title, Date, Pert			
	AI	Yi-Chou Tsai, et al., "Facile Synthesis of Trialkoxymolybdenum (VI) Alkylidyne Complexes for Alkyne Metathesis," Organometallics 2000, Volume 19, pages 5260-5262, (July 27, 2000).										
	AJ	Philippus F. Engel, et al., "Carbon-Carbon and Carbon-Heteroatom Coupling Reactions of Metallacarbynes," Chemical Rev. 1995, 95, pages 2281 - 2309, (January 27, 1994).										
	AK	Karin Weiss, et al., "Acyclic Diyne Metathesis (ADIMET), an Efficient Route to Poly(phenylene)ethynylenes (PPEs) and Noncunjugated Polyalkynylenes of High Molecular Weight," Angew. Chem. Int. Ed. Engl., 36, No. 5, pages 506-509, (1997).										
	AL	Andreas Mayr et al., "Electronic Communications between Metal Centers Across Unsaturated Alkylikyne Ligands," J. Am. Chem. Soc., 1999, 121, pgs. 1760 - 1761, (February, 1999).										
EXAMINER		DATE CONSIDERED										
EXAMINER:	Initi	al if citation considered,	whether	or not citation is in	conformar	ice with MF	PEP § 60°); Draw lin	e through citation	if not in		
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CIPE	Form PT	0-1449 RMATION DISCLOSURE CITATION	Docket Number (Optional) MTV-054.01	Application Number 10/666,565							
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n 9 2004	2	(Use several sheets if necessary)	Cummins, et al.								
LER O 2	3		Filing Date September 10, 2003	Group Art Unit 1764							
FRANENA	rt of		OTHER DOCUMENTS								
	AM	Richard R. Schrock, "High Oxidation State Multiple Metal-Carbon Bonds," Chem. Rev. 2002, 102, pgs. 145 - 179, (2002).									
i.	AN	Marie Pui Yin Yu, et al., "4-Iodobenzylidyne as a Precursor Ligand for Extended Unsaturated Alkylidyne Ligands", J. Chem. Soc., Dalton Trans., pgs. 2373 - 2378 (1988).									
	ΑО	Graeme Hogarth, et al., "Linking Metal Centres with Diimido Ligands: Synthesis, Electronic and Molecular Structure and Electrochemistry of Organometallic Ditungsten Complexes, J. Chem Soc., Dalton Trans.," pgs. 2705 - 2723 (1999).									
	AP	Andres Mayr, et al., "Recent Advances in the Chemistry of Metal-Carbon Triple Bonds," <u>Advances in Organometallic Chemistry</u> , Volume 32, pgs. 227 - 324, (1991).									
	AQ	Frederic Paul, et al., "Organometallic Molecular Wires and Other Nanoscale-Sized Devices. An Approach Using the Organoiron (dppe)Cp*Fe Building Block", pgs. 431 - 509, , Elsevier Science S.A., 178-180, (1998).									
	AR	James M. Blackwell, et al., "Enediynes via Sequential Acetylide Reductive Coupling and Alkyne Metathesis: Easy Access to Well-Defined Molybdenum Initiators for Alkyne Metathesis," Organometallics 2003, 22, pgs. 3351 - 3353 (2003).									
	AS	David S. Frohnapfel, et al., "Variable Electronic Coupling Through Hydrocarbon Spacers Bridging-Carbon Triple" J. Phys. Chem A 1998, 102, pgs. 5665 - 5669, (1998).									
	АТ	Keng-Yu Shih, et al., "Synthesis of Molybdenum Complexes that Contain Silylated Triamidoamine Ligsands. A μ-Dinitrogen Complex, Methyl and Acetylide Complexes, and Coupling of Acetylides," J. Am. Chem. Soc. 1994, 116, pgs. 8804 - 8805, (1994).									
	AU	Steven A. Krouse, et al. "The Synthesis of trans-(Me ₃ CO) ₃ W=CCH=CHC=W (OCMe ₃) ₃ , cis,cis-(Me ₃ CO) ₃ W=CCH=CHC=W (OCMe ₃) ₃ ," <u>Journal of Organometallic Chemistry, 355</u> , pgs. 257 - 265, (1988).									
	ΑV	B. E. Woodworth, et al "Stepwise Synthesis of (≡CCH₂CH₂C≡), (≡CCH≡CHC≡), and (≡CC≡CC≡) Bridges between Molybdenum or Tungsten Centers," J. Am. Chem. Soc. 1997, 119, pgs. 828 - 829, (1996).									
	AW	Hai Ping Xia, et al. "Synthesis of Symmetrical C₅H₅-Bridged Dimeric Ruthenium Complexes," Organometallics 1997, 16, pgs. 3557 - 3560, (1997).									
EXAMINER		DATE CONSIDERED									
		I if citation considered, whether or not citat t considered. Include copy of this form with	tion is in conformance with MPEP § 609; Draw I th next communication to the applicant.	ine through citation if not in							